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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/760,997	01/20/2004	Emad S. Isaac	IS01108TC/FLE MOTA:0005	1644
37103 7590 06/04/2007 FLETHCHER YODER (MOTOROLA) 7915 FM 1960 RD. WEST HOUSTON, TX 77070			EXAMINER WEISKOPF, MARIE	
			ART UNIT 3661	PAPER NUMBER
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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

10/760,997

Applicant(s)

ISAAC, EMAD S.

Examiner

Marie A. Weiskopf

Art Unit

3661

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 19 January 2007.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-45 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-45 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____.

DETAILED ACTION

Claim Rejections - 35 USC § 103

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

2. Claims 1-6, 12-14, 16-24, 31-33, 35, 38-41 and 44-45 are rejected under 35 U.S.C. 103(a) as being unpatentable over Ohler (US 6,961,658) in view of Kaji et al (US 2004/0102899).

- In regard to claim 1, Ohler discloses a vehicle navigation system comprising:
 - A signal processor having a memory (Column 2, lines 19-20)
 - A positioning system couple to the signal processor, the positioning system configured to determine position data relating to a location of the vehicle (Column 2, lines 1-20)
 - A program stored in the memory configured to:
 - Calculate at least one optimal route based on position data and destination data (Column 7, lines 18-37)
 - Provide the at least one optimal route to an operator data (Column 7, lines 18-37)
 - Determine if position data corresponds to an operator preferred route stored in the memory data (Column 7, lines 18-37)

- Provide the operator preferred route to the operator if the position data and the destination data correspond to the operator preferred route data (Column 7, lines 18-37)
- Allow the operator to select routes (Column 2, lines 49-51) The user is capable of selecting a travel route.

Ohler fails to specifically disclose determine if position data and destination data correspond to an operator preferred route stored in the memory data. Kaji et al discloses this. (paragraphs 27, 41 and 50). Further, Ohler fails to specifically disclose allowing the user to select between an preferred route and an optimal route. Ohler allows the user to view alternative routes if they are faster than the preferred route, but does not specifically state that the user can choose between the routes. Kaji et al discloses giving the user multiple routes and travel times and then allowing the user to choose between the routes. (paragraphs 58-61) It would have been obvious to one having ordinary skill in the art at the time of the invention to allow the user to enter both the present location and the destination information in order to find the preferred route. Ohler teaches that to find a preferred route, it takes into consideration the time of day and the starting position and if multiple routes for different destinations are listed, it allows the user to choose. Kaji et al discloses being able to enter the destination in order to quickly find the route the user is looking for. Further, Ohler discloses being able to select between routes and Kaji et al discloses being able to select between routes having different travel times. It would have been obvious to one having

ordinary skill in the art at the time of the invention to allow the user to actually select which route they want to take.

- In regard to claim 2, Ohler discloses wherein the program is configured to update the operator preferred route by monitoring the position data (Column 4, lines 10-35)
- In regard to claim 3, Ohler discloses wherein the navigation system comprises a user interface configured to facilitate entry of the destination data by a vehicle operator (Column 2, lines 49-51)
- In regard to claim 4, Ohler discloses wherein the user interface comprises a keyboard and a display (Column 2, lines 45-54)
- In regard to claim 5, Ohler discloses wherein the operator preferred route is defined by the number of times that a specific route is utilized. (Column 4, lines 36-41)
- In regard to claim 6, Ohler discloses wherein the operator preferred route is defined by the operator based on preferences of the operator (Column 4, lines 10-35)
- In regard to claim 12, Ohler discloses a system comprising:
 - A processor (Column 2, lines 19-20)
 - A positioning module in communication with the processor and configured to determine location data that relates to a location of a device (Column 2, lines 1-20)

- An interface module adapted to communicate data to a user of the device
(Column 2, lines 49-51)
- A routine utilized by the processor, the routine configured to:
 - Utilize location data from the positioning module (Column 7, lines 18-37)
 - Utilize destination data provided to the interface module (Column 7, lines 18-37)
 - Determine whether the location data and the destination data correspond to the defined route (Column 7, lines 18-37)
 - Generate an optimal route (Column 7, lines 18-37)
 - Provide the optimal route along with the preferred route to an operator (Column 2, lines 49-51)
 - Allow the operator to select a route (Column 2, lines 49-51)

Ohler fails to specifically disclose allowing the user to select between an preferred route and an optimal route. Ohler allows the user to view alternative routes if they are faster than the preferred route, but does not specifically state that the user can choose between the routes. Kaji et al discloses giving the user multiple routes and travel times and then allowing the user to choose between the routes. (paragraphs 58-61) Ohler discloses being able to select between routes and Kaji et al discloses being able to select between routes having different travel times. It would have been obvious to one having ordinary skill in

the art at the time of the invention to allow the user to actually select which route they want to take.

- In regard to claim 13, Ohler discloses comprising a communication module that is coupled to the processor and configured to exchange data with a system external to the device. (Column 2, lines 26-33)
- In regard to claim 14, Ohler discloses wherein the routine is further adapted to exchange navigation data and location data via the communication module with the external system via a wireless link (column 4, lines 8-37)
- In regard to claim 16, Ohler discloses wherein the interface module comprises a keyboard and display (Column 2, lines 45-54)
- In regard to claim 17, Ohler discloses wherein the positioning module is a global positioning system (Column 2, lines 12-17)
- In regard to claim 18, Ohler discloses a method of operation of a navigation system, the method comprising the acts of:
 - Receiving a destination location (Column 2, lines 45-53)
 - Receiving an origination location (Column 2, lines 59-64)
 - Determining if the origination location has been utilized with the destination location based on stored data (Column 7, lines 18-37)
 - Providing a default route if a default route has been defined in memory (Column 7, lines 18-37)
 - Generating an optimal route (Column 7, lines 18-37)

- Providing an optimal route along with the default route to a user (Column 7, lines 18-37)
- Allowing the user to select the default route or the optimal route (Column 2, lines 49-51)

Ohler fails to specifically disclose determine if position data and destination data correspond to an operator preferred route stored in the memory data. Kaji et al discloses this. (paragraphs 27, 41 and 50). Further, Ohler fails to specifically disclose allowing the user to select between an preferred route and an optimal route. Ohler allows the user to view alternative routes if they are faster than the preferred route, but does not specifically state that the user can choose between the routes. Kaji et al discloses giving the user multiple routes and travel times and then allowing the user to choose between the routes. (paragraphs 58-61) It would have been obvious to one having ordinary skill in the art at the time of the invention to allow the user to enter both the present location and the destination information in order to find the preferred route. Ohler teaches that to find a preferred route, it takes into consideration the time of day and the starting position and if multiple routes for different destinations are listed, it allows the user to choose. Kaji et al discloses being able to enter the destination in order to quickly find the route the user is looking for. Further, Ohler discloses being able to select between routes and Kaji et al discloses being able to select between routes having different travel times. It would have been obvious to one having

ordinary skill in the art at the time of the invention to allow the user to actually select which route they want to take.

- In regard to claim 19, Ohler discloses comprising setting a default route if a condition is set (Column 4, lines 10-35)
- In regard to claim 20, Ohler discloses comprising setting the condition if the number of time the origination location has been utilized with the destination location is greater than or equal to a specific number of times (Column 5, lines 33-54)
- In regard to claim 21, Ohler discloses comprising setting the condition if the user enters that an actual route is a default route (Column 4, lines 10-35)
- In regard to claim 22, Ohler discloses comprising monitoring an actual route from the origination location to the destination location (Column 4, lines 10-35)
- In regard to claim 24, Ohler discloses wherein determining further comprises accessing stored data in memory within the device (Column 3, lines 4-19)
- In regard to claim 31, Ohler discloses a method of manufacturing a navigation system comprising the acts of:
 - Providing a navigation system comprising a processor and a memory (Column 2, lines 19-20)
 - Coupling a user interface to the processor, the user interface configured to enter data from an operator (Column 2, lines 49-51)
 - Coupling a display to the processor, the display configured to present route data to the operator (Column 2, lines 49-51)

- Providing a program within the memory that is adapted to:
 - Receive destination data from the user interface (Column 2, lines 49-51)
 - Receive origination data from one of the positioning module and the user interface (Column 2, lines 29-64)
 - Present a preferred route if the origination data correspond to the preferred route (Column 7, lines 18-37)
 - Generate at least one optimal route (Column 7, lines 18-37)
 - Present the optimal route and the preferred route to the operator (Column 7, lines 18-37)
 - Allow the operator to select a route (Column 2, lines 49-51)

Ohler fails to specifically disclose determine if position data and destination data correspond to an operator preferred route stored in the memory data. Kaji et al discloses this. (paragraphs 27, 41 and 50). Further, Ohler fails to specifically disclose allowing the user to select between an preferred route and an optimal route. Ohler allows the user to view alternative routes if they are faster than the preferred route, but does not specifically state that the user can choose between the routes. Kaji et al discloses giving the user multiple routes and travel times and then allowing the user to choose between the routes. (paragraphs 58-61) It would have been obvious to one having ordinary skill in the art at the time of the invention to allow the user to enter both the present location and the destination information in order to find the preferred route. Ohler teaches that to find a

preferred route, it takes into consideration the time of day and the starting position and if multiple routes for different destinations are listed, it allows the user to choose. Kaji et al discloses being able to enter the destination in order to quickly find the route the user is looking for. Further, Ohler discloses being able to select between routes and Kaji et al discloses being able to select between routes having different travel times. It would have been obvious to one having ordinary skill in the art at the time of the invention to allow the user to actually select which route they want to take.

- In regard to claim 32, Ohler discloses comprises coupling a communications module to the processor (Column 2, lines 12-17)
- In regard to claim 33, Ohler discloses comprises configuring the program to communicate with an external server to download traffic data via the communications module (column 2, lines 12-17)
- In regard to claim 35, Ohler discloses wherein the program is configured to allow the operator to enter the preferred route (Column 4, lines 12-35). Ohler allows the user to set the fact that the route needs to be recorded as a routine route and therefore the operator is then allowed to enter the preferred route.
- In regard to claim 38, Ohler discloses wherein the program is adapted to allow the user to enter the defined route. (Column 4, lines 12-35) Ohler allows the user to set the fact that the route needs to be recorded as a routine route and therefore the operator is then allowed to enter the preferred route.

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- In regard to claim 39, Ohler discloses wherein the program learns the defined route based on vehicle position information (Column 4, lines 12-35)
- In regard to claim 40, Ohler discloses comprising allowing the user to enter the default route. (Column 4, lines 12-35) Ohler allows the user to set the fact that the route needs to be recorded as a routine route and therefore the operator is then allowed to enter the preferred route.
- In regard to claim 41, Ohler discloses comprising learning the default route based on vehicle position information (Column 4, lines 12-35)
- In regard to claim 44, Ohler discloses wherein the program is adapted to allow the operator to enter the preferred route. (Column 4, lines 12-35) Ohler allows the user to set the fact that the route needs to be recorded as a routine route and therefore the operator is then allowed to enter the preferred route.
- In regard to claim 45, Ohler discloses wherein the program is adapted to learn the preferred route based on vehicle position information (Column 4, lines 12-35)

3. Claims 7-11, 25-30, 36-37 and 42-43 are rejected under 35 U.S.C. 103(a) as being unpatentable over Ohler (US 6,961,658) in view of Kaji et al (US 2004/0102899) and further in view of Pu et al (US 6,292,743). Ohler and Kaji et al are discussed above and Pu et al, as mentioned in the previous office action, discloses a mobile navigation system.

- In regard to claim 7, Ohler discloses a system comprising:
 - A vehicle having a navigation system (Abstract)
 - A navigation system having a program that is adapted to:

- Generate an optimal route from an origination location to a destination location (Column 7, lines 18-37)
- Access a client profile stored in a memory that is coupled to the navigation server to determine whether an operator preferred route is defined (Column 8, lines 35-48)
- Provide the optimal route and the preferred route to the operator of the vehicle (Column 7, lines 18-37)
- Allow the operator to select a route (Column 2, lines 49-51)

Ohler fails to specifically disclose determine if position data and destination data correspond to an operator preferred route stored in the memory data. Kaji et al discloses this. (paragraphs 27, 41 and 50). Further, Ohler fails to specifically disclose allowing the user to select between an preferred route and an optimal route. Ohler allows the user to view alternative routes if they are faster than the preferred route, but does not specifically state that the user can choose between the routes. Kaji et al discloses giving the user multiple routes and travel times and then allowing the user to choose between the routes. (paragraphs 58-61) It would have been obvious to one having ordinary skill in the art at the time of the invention to allow the user to enter both the present location and the destination information in order to find the preferred route. Ohler teaches that to find a preferred route, it takes into consideration the time of day and the starting position and if multiple routes for different destinations are listed, it allows the user to choose. Kaji et al discloses being able to enter the destination in order to

quickly find the route the user is looking for. Further, Ohler discloses being able to select between routes and Kaji et al discloses being able to select between routes having different travel times. It would have been obvious to one having ordinary skill in the art at the time of the invention to allow the user to actually select which route they want to take. Further Ohler and Kaji et al fail to disclose a navigation server adapted to communicate with the navigation system, wherein the navigation servers had a program that is adapted to provide the program above. Pu et al, on the other hand, does disclose a navigation server adapted to communicate with the navigation system via a network. (Column 4, line 64 – Column 5, line 11) It would have been obvious to one having ordinary skill in the art at the time of the invention to include the navigation server of Pu et al with the navigation system as taught by Ohler in order to provide a system that has advantages over having the vehicle do all of the route calculation as taught by Pu et al. (Column 2, line 59 – Column 3, line 10)

- In regard to claim 8, Pu et al discloses wherein the network comprises a satellite link between the navigation system and the navigation server (Column 5, lines 35-38)
- In regard to claim 9, Pu et al discloses wherein the network comprises a cellular node between the navigation system and the navigation server (Column 4, lines 12-13)

- In regard to claim 10, Ohler discloses wherein the program interacts with a traffic server to integrate traffic data with the origination location and the destination location to generate the optimal route. (Column 2, lines 26-33)
- In regard to claim 11, Pu et al discloses wherein the program interacts with an information server to integrate mapping data with the origination location and the destination location to generate the optimal route. (Column 8, lines 45-59)
- In regard to claim 36, Ohler discloses wherein the program is adapted to allow the operator to enter the preferred route. (Column 4, lines 12-35) Ohler allows the user to set the fact that the route needs to be recorded as a routine route and therefore the operator is then allowed to enter the preferred route.
- In regard to claim 37, Ohler discloses wherein the program learns the preferred route based on vehicle position information (Column 4, lines 12-35)
- In regard to claim 23, Ohler fails to disclose wherein determining further comprises accessing stored data in a database external to the device. Pu et al however, discloses having a database external to the device. (Column 3, lines 4-10) It would have been obvious to one having ordinary skill in the art at the time of the invention to include the database external to the device so the user doesn't have to update their mapping database whenever new information needs to be added as discussed by Pu et al.
- In regard to claim 25, Ohler discloses a method of operation of a navigation system, the method comprising the acts of:

- Receiving destination data from a user interface of a vehicle (Column 2, lines 45-53)
- Receiving origination data (Column 2, lines 29-64)
- Accessing a client profile (Column 8, lines 35-48)
- Comparing the client profile with the origination data and the destination data (Column 7, lines 18-37)
- Determining if the origination data corresponds to a defined route in the client profile that is based on a user's experience and knowledge (Column 7, lines 18-37)
- Generating an optimal route (Column 7, lines 18-37)
- Communicating the optimal route and the user defined route to the user (Column 7, lines 18-37)
- Allowing the user to select a route (Column 2, lines 49-51)

Ohler fails to specifically disclose determine if position data and destination data correspond to an operator preferred route stored in the memory data. Kaji et al discloses this. (paragraphs 27, 41 and 50). Further, Ohler fails to specifically disclose allowing the user to select between an preferred route and an optimal route. Ohler allows the user to view alternative routes if they are faster than the preferred route, but does not specifically state that the user can choose between the routes. Kaji et al discloses giving the user multiple routes and travel times and then allowing the user to choose between the routes. (paragraphs 58-61) It would have been obvious to one having ordinary skill in the art at the time of the

invention to allow the user to enter both the present location and the destination information in order to find the preferred route. Ohler teaches that to find a preferred route, it takes into consideration the time of day and the starting position and if multiple routes for different destinations are listed, it allows the user to choose. Kaji et al discloses being able to enter the destination in order to quickly find the route the user is looking for. Further, Ohler discloses being able to select between routes and Kaji et al discloses being able to select between routes having different travel times. It would have been obvious to one having ordinary skill in the art at the time of the invention to allow the user to actually select which route they want to take. Further Ohler and Kaji et al fail to disclose communicating the origination data and the destination data to a server via a network. Pu et al, on the other hand, does disclose a navigation server adapted to communicate with the navigation system via a network. (Column 4, line 64 – Column 5, line 11) It would have been obvious to one having ordinary skill in the art at the time of the invention to include the navigation server of Pu et al with the navigation system as taught by Ohler in order to provide a system that has advantages over having the vehicle do all of the route calculation as taught by Pu et al. (Column 2, line 59 – Column 3, line 10)

- In regard to claim 26, Ohler discloses comprising presenting the at least one of the optimal route and the user defined route to an operator of the vehicle (Column 2, lines 49-51)

- In regard to claim 27, Ohler discloses comprising setting the user defined route if a number of times a route is associated with the origination data and the destination data is greater than or equal to a specific value
 - In regard to claim 28, Pu et al discloses wherein communicating comprises utilizing a satellite link between the server and the vehicle (Column 5, lines 35-38)
 - In regard to claim 29, Ohler discloses comprises monitoring an actual route from an origination location that corresponds to the origination data to a destination location that corresponds to the destination data (Column 4, lines 12-35)
 - In regard to claim 30, Ohler discloses wherein generating the optimal route is automatically calculated based on a predefined routine (Column 4, lines 12-35)
 - In regard to claim 42, Ohler discloses comprising allowing the user to enter the defined route (Column 4, lines 12-35)
 - In regard to claim 43, Ohler discloses comprising learning the defined route based on vehicle position information (Column 4, lines 12-35)
4. Claims 15 and 34 are rejected under 35 U.S.C. 103(a) as being unpatentable over Ohler (US 6,961,658) in view of Kaji et al (US 2004/0102899) and further in view of Stefan et al (US 6,212,473). Ohler is discussed above and Stefan et al discloses a vehicle navigation system having inferred user preferences.
- In regard to claim 15, Ohler and Kaji et al fail to disclose the interface module utilizing hands-free voice capability. Stefan et al discusses user inputs being used by known methods, which includes voice input. (Column 3, lines 1-4) It

would have been obvious to one having ordinary skill in the art at the time of the invention to include using voice input for inputting information since it is well known and would allow the user to not have to type in destination information.

- In regard to claim 34, Ohler and Kaji et al fail to disclose communicating with an external server to download construction data via the communication module. Stefan et al discusses having a wide-area traffic monitoring system which also monitors the amount of road construction the roads. (Column 3, lines 13-18) It would have been obvious to one having ordinary skill in the art at the time of the invention to make sure that the traffic monitoring system used would include road construction areas because these are areas that can cause congestion and slowing.

Conclusion

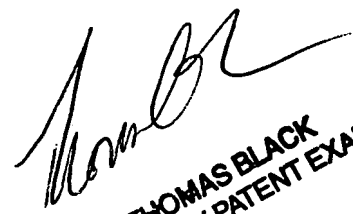
Any inquiry concerning this communication or earlier communications from the examiner should be directed to Marie A. Weiskopf whose telephone number is (571) 272-6288. The examiner can normally be reached on Monday-Thursday between 7:00 AM and 5:30 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Thomas Black can be reached on (571) 272-6956. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

MW



THOMAS BLACK
SUPERVISORY PATENT EXAMINER